NORLITE, LLC

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January 30, 2013

Karen M. Gaidasz, CPESC
Environmental Analyst
New York State Department of Environmental Conservation
Region 4
1130 North Westcott Road
Schenectady, NY 12306-2014

VIA CERTIFIED MAIL: 7009 0080 0001 5214 7505
RETURN RECEIPT REQUESTED

Mr. Kenneth Eng
Air Compliance Branch
United States Environmental Protection Agency
Region 2
290 Broadway
New York, NY 10007-1866

VIA CERTIFIED MAIL: 7009 0080 0001 5214 7734
RETURN RECEIPT REQUESTED

Re: Semi-Annual MACT "Periodic Startup, Shutdown and Malfunction Report" and "Excess Emissions and Continuous Monitoring System Performance Report"

Dear Sirs:

In accordance with 40 CFR 63.10(d)(5)(i) and 40 CFR 63.10(e)(3), the Norlite Corporation (Norlite) is submitting the above-mentioned reports for the timeframe of 07/01/12 thru 12/31/12. The reports are being submitted as one document.

The report lists of all of the startups, shutdowns and malfunctions which occurred at the Norlite facility during the above timeframe. All of the startups, shutdowns and malfunctions that occurred were consistent with Norlite's Startup, Shutdown and Malfunction Plan (SSMP).

During this reporting period, Norlite submitted Excessive Exceedance Reports as required. The results of the investigation concluded the majority of the exceedances were a result of the 1 second time delay cutoff limit of -0.00 inches of water column associated with the negative backend chamber pressure. During the timeframe for this report, Norlite conducted several intense inspections of the rear chamber systems for both kilns. Since the system on Kiln 2 was entering its second year of operation, Norlite found the system needed certain maintenance such as inner seal replacement, draft fan replacement, as well as overall internal cleaning of the duct work. Norlite has worked out a routine preventative maintenance plan to keep these systems in proper operation. Some time was needed to create this plan since these are one of kind systems and Norlite needed to learn the characteristics of their operation before a complete comprehensive plan could be created. At no time were visible emissions witnessed and at no time did emission exceedances occurred during this reporting period.

DCL: 1043

Norlite, LLC

Should you have any questions regarding this letter, please contact me at (518) 235-0401.

Sincerely,

Thomas M. Van Vranken

Thomas M. Van Vranken
Environmental Manager

ECC: Jim Lansing, NYSDEC/CO-w/attachments
Joseph Hadersbeck, NYSDEC-4 – w/attachments
Don Spencer, NYSDEC-4 – w/attachments
Tita LaGrimas, Tradebe – w/attachments

DCL: 1043

NORLITE, LLC
PERIODIC STARTUP, SHUTDOWN AND MALFUNCTION REPORT and
THE EXCESS EMISSIONS AND MONITORING SYSTEM PERFORMANCE REPORT
40 CFR 63.10(d)(5)(i) and 40 CFR 63.10(e)(3)
7/1/12 thru 12/31/12
KILN 1

Start Date	Start Time	End Date	End Time	#	Downtime	Event	Cause	Parameter	Limit	Corrective Action
7/2/2012	11:36:31	7/2/2012	11:45:23	1	0:08:52	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge That Triggered the Instantaneous Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow and Adjusted LGF Line Pressure
7/3/2012	4:08:59	7/3/2012	4:09:49	2	0:00:50	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge That Triggered the Instantaneous Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow and Adjusted LGF Line Pressure
7/10/2012	14:55:03	7/10/2012	14:55:29	3	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge That Triggered the Instantaneous Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow and Adjusted LGF Line Pressure
7/13/2012	5:06:30	7/13/2012	9:27:00	4	4:20:30	Shutdown	Kiln Maintenance	Shutdown		
7/13/2012	9:27:00	7/13/2012	9:27:00	5	0:00:00	Startup	Pilot On	Startup		
7/13/2012	11:21:31	7/13/2012	11:43:54	6	0:22:23	Shutdown	Lost Pilot	Shutdown		
7/13/2012	11:43:54	7/13/2012	11:43:54	7	0:00:00	Startup	Pilot On	Startup		
7/13/2012	12:10:02	7/13/2012	23:59:59	8	11:49:57	Shutdown	Kiln Maintenance	Shutdown		
7/14/2012	0:00:00	7/14/2012	20:25:00	9	20:25:00	Shutdown	Power Outage In Order to Conduct Plant Electrical Maintenance	Shutdown		
7/14/2012	20:25:00	7/14/2012	20:25:00	10	0:00:00	Startup	Pilot On	Startup		
7/14/2012	20:37:33	7/14/2012	20:41:03	11	0:03:30	Shutdown	Lost Pilot	Shutdown		
7/14/2012	20:41:03	7/14/2012	20:41:03	12	0:00:00	Startup	Pilot On	Startup		
7/19/2012	12:16:57	7/19/2012	12:17:25	13	0:00:28	Shutdown	Power Outage	Shutdown		
7/19/2012	12:17:25	7/19/2012	12:17:25	14	0:00:00	Startup	Pilot On	Startup		
7/19/2012	14:07:28	7/19/2012	14:07:49	15	0:00:21	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
7/21/2012	6:08:44	7/21/2012	6:36:04	16	0:27:20	Malfunction	End of Burn Tank Reached Which Caused a LGF Flow Surge, Triggering the Instantaneous Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Switched Tanks and Adjusted Fuel Flow

7/30/2012	18:13:13	7/30/2012	18:14:56	17	0:01:43	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
7/30/2012	23:48:08	7/30/2012	23:50:45	18	0:02:37	Malfunction	Stack Gas Probe was Dirty Which Caused the Instantaneous Upper Instrument Setpoint To Be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	I & E Cleaned Probe
7/31/2012	19:41:57	7/31/2012	19:42:32	19	0:00:35	Malfunction	Instantaneous Upper Instrument Setpoint Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
8/8/2012	22:33:47	8/8/2012	23:59:59	20	1:26:12	Shutdown	Power Outage	Shutdown		
8/9/2012	0:00:00	8/9/2012	0:07:42	21	0:07:42	Shutdown	Power Outage	Shutdown		
8/9/2012	0:07:42	8/9/2012	0:07:42	22	0:00:00	Startup	Pilot On	Startup		
8/9/2012	7:40:41	8/9/2012	7:43:09	23	0:02:28	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Scrubber Recirc. Rate Span	Scrubber Recirc. Rate	Span	Adjusted Scrubber Recirc. Rate
8/12/2012	0:47:19	8/12/2012	1:50:08	24	1:02:49	Malfunction	The Kiln Operator Attempted to Reestablish LGF Fuel Flow Which Caused a Fuel Flow Surge That Triggered a Pressure Pulse to Occur in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
8/13/2012	7:42:29	8/13/2012	7:43:51	25	0:01:22	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span	LGF Flow	Span	Adjusted Fuel Flow
8/13/2012	16:40:28	8/13/2012	16:45:05	26	0:04:37	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span	LGF Flow	Span	Adjusted Fuel Flow
8/14/2012	13:31:20	8/14/2012	13:38:03	27	0:06:43	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span	LGF Flow	Span	Adjusted Fuel Flow
8/18/2012	1:58:05	8/18/2012	1:59:28	28	0:01:23	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
8/25/2012	1:18:57	8/25/2012	1:19:55	29	0:00:58	Malfunction	Instantaneous Upper Instrument Setpoint Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
8/26/2012	5:56:19	8/26/2012	5:57:18	30	0:00:59	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

8/29/2012	16:10:08	8/29/2012	16:10:26	31	0:00:18	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span	LGF Flow	Span	Adjusted Fuel Flow
8/29/2012	16:15:19	8/29/2012	16:15:42	32	0:00:23	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span	LGF Flow	Span	Adjusted Fuel Flow
8/30/2012	13:16:57	8/30/2012	13:18:00	33	0:01:03	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/30/2012	13:47:33	8/30/2012	13:48:19	34	0:00:46	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/1/2012	2:14:40	9/1/2012	2:16:01	35	0:01:21	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/3/2012	8:00:00	9/3/2012	9:48:00	36	1:48:00	CEM	Train B, CO Low Span	Monitoring Equip.	Span	Recalibrated
9/3/2012	8:00:00	9/3/2012	9:48:00	37	1:48:00	CEM	Train B, CO High Span	Monitoring Equip.	Span	Recalibrated
9/3/2012	8:00:00	9/3/2012	9:48:00	38	1:48:00	CEM	Train B, O2 Single Zero	Monitoring Equip.	Span	Recalibrated
9/5/2012	0:00:00	9/5/2012	23:59:59	39	23:59:59	Shutdown	Kiln Maintenance	Shutdown		
9/6/2012	0:00:00	9/6/2012	23:59:59	40	23:59:59	Shutdown	Kiln Maintenance	Shutdown		
9/7/2012	0:00:00	9/7/2012	1:51:03	41	1:51:03	Shutdown	Kiln Maintenance	Shutdown		
9/7/2012	1:51:03	9/7/2012	1:51:03	42	0:00:00	Startup	Pilot On	Startup		
9/8/2012	8:00:00	9/8/2012	9:59:00	43	1:59:00	CEM	Train B, CO Low Span	Monitoring Equip.	Span	Leak Repaired
9/8/2012	8:00:00	9/8/2012	9:59:00	44	1:59:00	CEM	Train B, CO High Span	Monitoring Equip.	Span	Leak Repaired
9/8/2012	10:34:40	9/8/2012	10:36:38	45	0:01:58	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/10/2012	8:00:00	9/10/2012	12:47:00	46	4:47:00	CEM	Train B, O2 Single Zero	Monitoring Equip.	Span	Leak Repaired
9/10/2012	8:00:00	9/10/2012	12:47:00	47	4:47:00	CEM	Train B, CO Low Span	Monitoring Equip.	Span	Leak Repaired
9/10/2012	8:00:00	9/10/2012	12:47:00	48	4:47:00	CEM	Train B, CO High Span	Monitoring Equip.	Span	Leak Repaired

9/10/2012	13:10:48	9/10/2012	13:12:35	49	0:01:47	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span / High CO's	LGF Flow	Span	Adjusted Fuel Flow
9/11/2012	18:29:18	9/11/2012	18:52:31	50	0:23:13	Malfunction	End of Burn Tank Was Reached Which Caused a Pressure Pulse in the Kiln System Due to the Loss of Flame. The Pressure Pulse Affected the Rear Chamber System	Back Chamber Pressure, 1 Second Delay	Opl	Switched Tanks and Reestablished Fuel Flow
9/13/2012	12:42:40	9/13/2012	12:43:47	51	0:01:07	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/15/2012	1:15:05	9/15/2012	1:15:33	52	0:00:28	Malfunction	The Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Kiln Draft. Ultimately, the Kiln was Shutdown on 9/18/12 to Determine the Cause of the Reduced Draft. Baghouse Maintenance and Scrubber Maintenance was Conducted	Back Chamber Pressure, 1 Second Delay	Opl	Kiln Shutdown for Maintenance
9/15/2012	1:16:09	9/15/2012	1:16:42	53	0:00:33	Malfunction	The Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Kiln Draft. Ultimately, the Kiln was Shutdown on 9/18/12 to Determine the Cause of the Reduced Draft. Baghouse Maintenance and Scrubber Maintenance was Conducted	Back Chamber Pressure, 1 Second Delay	Opl	Kiln Shutdown for Maintenance
9/18/2012	9:45:41	9/18/2012	9:49:44	54	0:04:03	Malfunction	The Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Kiln Draft. Ultimately, the Kiln was Shutdown on 9/18/12 to Determine the Cause of the Reduced Draft. Baghouse Maintenance and Scrubber Maintenance was Conducted	LGF Flow	Span	Kiln Shutdown for Maintenance
9/18/2012	15:05:13	9/18/2012	20:11:30	55	5:06:17	Shutdown	Power Outage	Shutdown		
9/18/2012	20:11:30	9/18/2012	20:11:30	56	0:00:00	Startup	Pilot On	Startup		
9/18/2012	20:11:46	9/18/2012	20:15:42	57	0:03:56	Shutdown	Pilot Tripped on Initial Heat Up	Shutdown		
9/18/2012	20:15:42	9/18/2012	20:15:42	58	0:00:00	Startup	Pilot On	Startup		
9/19/2012	3:42:49	9/19/2012	3:43:42	59	0:00:53	Malfunction	Kiln 2 was Down Due to a Power Failure. The Isolation Valve on the Draft System for the Rear Chamber System was Not Closed Which Caused An Overall Reduction in Draft Capability On the Kiln 1 System	Back Chamber Pressure, 1 Second Delay	Opl	Closed Isolation Valve and Adjusted Fan System

9/19/2012	10:42:02	9/19/2012	10:47:31	60	0:05:29	Malfunction	Kiln 2 was Down Due to a Power Failure. The Isolation Valve on the Draft System for the Rear Chamber System was Not Closed Which Caused An Overall Reduction in Draft Capability On the Kiln 1 System	Back Chamber Pressure, 1 Second Delay	Opl	Closed Isolation Valve and Adjusted Fan System
9/20/2012	4:55:49	9/20/2012	4:56:33	61	0:00:44	Malfunction	Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Draft. Ultimately, the Kiln was Shutdown on 9/26/12 for Baghouse and Scrubber Maintenance	Back Chamber Pressure, 1 Second Delay	Opl	Kiln Shutdown for Maintenance
9/20/2012	17:17:34	9/20/2012	17:19:45	62	0:02:11	Malfunction	Scrubber and Baghouse Maintenance Occurred on 9/26/12 to Address High Stack Gas Flow Readings	Stack Gas Flow Rate	Span	Kiln Shutdown for Maintenance
9/22/2012	8:01:43	9/22/2012	8:07:19	63	0:05:36	Malfunction	Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Draft. Ultimately, the Kiln was Shutdown on 9/26/12 for Baghouse and Scrubber Maintenance	Back Chamber Pressure, 1 Second Delay	Opl	Kiln Shutdown For Maintenance
9/24/2012	12:11:57	9/24/2012	12:12:28	64	0:00:31	Malfunction	Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Draft. Ultimately, the Kiln was Shutdown on 9/26/12 for Baghouse and Scrubber Maintenance	Front Kiln Pressure, 1 Second Delay	Opl	Kiln Shutdown For Maintenance
9/25/2012	15:00:52	9/25/2012	15:06:39	65	0:05:47	Malfunction	Kiln Operators Continued to Make Fan Adjustments to Maintain Sufficient Draft. Ultimately, the Kiln was Shutdown on 9/26/12 for Baghouse and Scrubber Maintenance	Back Chamber Pressure, 1 Second Delay	Opl	Kiln Shutdown For Maintenance
9/26/2012	3:57:04	9/26/2012	17:40:09	66	13:43:05	Shutdown	Kiln Maintenance	Shutdown		
9/26/2012	17:40:09	9/26/2012	17:40:09	67	0:00:00	Startup	Pilot On	Startup		
9/27/2012	9:07:20	9/27/2012	9:08:25	68	0:01:05	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused the Instantaneous Upper Instrument Setpoint to be Reached for LGF Span	LGF Flow	Span	Adjusted Fuel Flow
10/1/2012	5:11:37	10/1/2012	5:17:18	69	0:05:41	Malfunction	Kiln 2 Was Down Due to a Power Failure. The Isolation Valve on the Draft System for the Rear Chamber System Was Not Closed Which Caused an Overall Reduction in Draft Capability on the Kiln 1 System	Back Chamber HRA	Opl	Closed Isolation Valve and Adjusted Fan System
10/1/2012	10:26:37	10/1/2012	10:58:49	70	0:32:12	Malfunction	Kiln 2 Was Down Due to a Power Failure. The Isolation Valve on the Draft System for the Rear Chamber System Was Not Closed Which Caused an Overall Reduction in Draft Capability on the Kiln 1 System	Back Chamber HRA	Opl	Closed Isolation Valve and Adjusted Fan System
10/1/2012	21:19:00	10/1/2012	21:35:21	71	0:16:21	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/3/2012	18:18:35	10/3/2012	18:30:41	72	0:12:06	Shutdown	Power Outage	Shutdown		
10/3/2012	18:30:41	10/3/2012	18:30:41	73	0:00:00	Startup	Pilot On	Startup		

10/4/2012	10:07:00	10/4/2012	10:07:50	74	0:00:50	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/5/2012	0:23:57	10/5/2012	0:37:33	75	0:13:36	Shutdown	Kiln Maintenance	Shutdown		
10/5/2012	0:37:33	10/5/2012	0:37:33	76	0:00:00	Startup	Pilot On	Startup		
10/7/2012	2:04:43	10/7/2012	2:05:20	77	0:00:37	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/7/2012	5:21:18	10/7/2012	5:23:02	78	0:01:44	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/7/2012	7:03:14	10/7/2012	7:09:35	79	0:06:21	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/7/2012	7:35:49	10/7/2012	7:42:27	80	0:06:38	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/11/2012	3:57:50	10/11/2012	3:58:17	81	0:00:27	Malfunction	Recent Power Delivery Problems Caused Several Scrubber Issues. Kiln 1 Was Shutdown on 10/17/12 to Conduct More Scrubber and Baghouse Maintenance. The Issues Caused the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Kiln Shutdown on 10/17/12
10/11/2012	21:33:12	10/11/2012	21:33:31	82	0:00:19	Malfunction	Recent Power Delivery Problems Caused Several Scrubber Issues. Kiln 1 Was Shutdown on 10/17/12 to Conduct More Scrubber and Baghouse Maintenance. The Issues Caused the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Kiln Shutdown on 10/17/12
10/11/2012	21:43:09	10/11/2012	21:43:26	83	0:00:17	Malfunction	Recent Power Delivery Problems Caused Several Scrubber Issues. Kiln 1 Was Shutdown on 10/17/12 to Conduct More Scrubber and Baghouse Maintenance. The Issues Caused the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Kiln Shutdown on 10/17/12
10/11/2012	22:57:38	10/11/2012	22:58:00	84	0:00:22	Malfunction	Recent Power Delivery Problems Caused Several Scrubber Issues. Kiln 1 Was Shutdown on 10/17/12 to Conduct More Scrubber and Baghouse Maintenance. The Issues Caused the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Kiln Shutdown on 10/17/12
10/11/2012	23:19:05	10/11/2012	23:19:22	85	0:00:17	Malfunction	Recent Power Delivery Problems Caused Several Scrubber Issues. Kiln 1 Was Shutdown on 10/17/12 to Conduct More Scrubber and Baghouse Maintenance. The Issues Caused the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Kiln Shutdown on 10/17/12

10/11/2012	23:25:02	10/11/2012	23:25:19	86	0:00:17	Malfunction	Recent Power Delivery Problems Caused Several Scrubber Issues. Kiln 1 Was Shutdown on 10/17/12 to Conduct More Scrubber and Baghouse Maintenance. The Issues Caused the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Kiln Shutdown on 10/17/12
10/12/2012	3:49:25	10/12/2012	3:49:58	87	0:00:33	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / The Kiln was Shutdown for Scrubber Maintenance on 10/17/12	Stack Gas Flow Rate	Span	Adjusted Fuel Flow / Scrubber Maintenance on 10/17/12
10/12/2012	12:10:23	10/12/2012	13:06:11	88	0:55:48	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / The Kiln was Shutdown for Scrubber Maintenance on 10/17/12	Stack Gas Flow Rate	Span	Adjusted Fuel Flow / Scrubber Maintenance on 10/17/12
10/12/2012	13:08:39	10/12/2012	13:09:02	89	0:00:23	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / The Kiln was Shutdown for Scrubber Maintenance on 10/17/12	Stack Gas Flow Rate	Span	Adjusted Fuel Flow / Scrubber Maintenance on 10/17/12
10/13/2012	6:43:29	10/13/2012	6:44:29	90	0:01:00	Malfunction	A Large Aggregate Ball Caused the Front Hood Doors to Open Which Caused a Momentary Reduction in Differential Pressure at the Front End	Front Kiln Pressure, 1 Second Delay	Opl	Removed the Large Aggregate Ball From the Cooler Door
10/15/2012	4:57:38	10/15/2012	4:58:20	91	0:00:42	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / The Kiln was Shutdown for Scrubber Maintenance on 10/17/12	Stack Gas Flow Rate	Span	Adjusted Fuel Flow / Scrubber Maintenance on 10/17/12
10/17/2012	1:58:31	10/17/2012	17:53:08	92	15:54:37	Shutdown	Kiln Maintenance	Shutdown		
10/17/2012	17:53:08	10/17/2012	17:53:08	93	0:00:00	Startup	Pilot On	Startup		
10/23/2012	14:58:20	10/23/2012	14:59:02	94	0:00:42	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge Triggering the Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
10/25/2012	4:18:56	10/25/2012	6:24:56	95	2:06:00	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/28/2012	6:58:47	10/28/2012	10:26:19	96	3:27:32	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
10/31/2012	2:59:51	10/31/2012	21:48:29	97	18:48:38	Shutdown	Kiln Maintenance	Shutdown		
10/31/2012	21:48:29	10/31/2012	21:48:29	98	0:00:00	Startup	Pilot On	Startup		
11/1/2012	17:00:27	11/1/2012	17:10:06	99	0:09:39	Malfunction	Lime Feeder Stopped Which Caused the Lime Feed Rate HRA to Drop	Lime Feed Rate	Opl	Switched Feeder
11/3/2012	18:08:16	11/3/2012	18:09:41	100	0:01:25	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Pressure Which Caused the Differential Pressure at the Front Kiln Hood and Rear Chamber System to Decrease and Cause a Simultaneous Front and Back Chamber Pressure Cutoff to Occur	Simultaneous Instantaneous Front & Back Chamber Pressure	Opl	Adjusted Cooler and ID Fans to Reestablish Proper Draft

11/3/2012	18:24:21	11/3/2012	18:24:57	101	0:00:36	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Rear Chamber Pressure Which Caused the Differential Pressure at the Rear Chamber System to Decrease and Cause a Rear Chamber System Cutoff to Occur	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/3/2012	18:25:01	11/3/2012	18:25:30	102	0:00:29	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Rear Chamber Pressure Which Caused the Differential Pressure at the Rear Chamber System to Decrease and Cause a Rear Chamber System Cutoff to Occur	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/6/2012	9:45:45	11/6/2012	9:52:14	103	0:06:29	Shutdown	Power Blip	Shutdown		
11/6/2012	9:52:14	11/6/2012	9:52:14	104	0:00:00	Startup	Pilot On	Startup		
11/7/2012	6:56:42	11/7/2012	8:42:55	105	1:46:13	Shutdown	Power Outage	Shutdown		
11/7/2012	8:42:55	11/7/2012	8:42:55	106	0:00:00	Startup	Pilot On	Startup		
11/8/2012	22:19:44	11/8/2012	22:20:38	107	0:00:54	Malfunction	After A Tank Switch, the LGF Pump Started Pulsing Which Caused Fuel Flow Pulses at the Kilns. The Fuel Flow Pulses Caused Pressure Pulses in the Kiln System Which Affected the Rear Chamber System.	Back Chamber Pressure, 1 Second Delay	Opl	Restarted LGF Pump
11/8/2012	22:21:12	11/8/2012	22:22:26	108	0:01:14	Malfunction	After A Tank Switch the LGF Pump Started Pulsing Which Caused Fuel Flow Pulses at the Kilns. The Fuel Flow Pulses Caused Pressure Pulses in the Kiln System Which Affected the Rear Chamber System	Back Chamber Pressure, 1 Second Delay	Opl	Restarted LGF Pump
11/8/2012	22:26:20	11/8/2012	23:31:49	109	1:05:29	Malfunction	Previous Back Chamber Cutoff Caused System Instability Which Caused CO's to Spike	Carbon Monoxide	Opl	Adjusted Fuel Flow
11/9/2012	19:19:41	11/9/2012	19:36:34	110	0:16:53	Shutdown	Power Outage	Shutdown		
11/9/2012	19:36:34	11/9/2012	19:36:34	111	0:00:00	Startup	Pilot On	Startup		
11/9/2012	19:39:07	11/9/2012	21:15:45	112	1:36:38	Shutdown	Power Outage	Shutdown		
11/9/2012	21:15:45	11/9/2012	21:15:45	113	0:00:00	Startup	Pilot On	Startup		
11/9/2012	21:32:17	11/9/2012	23:59:59	114	2:27:42	Shutdown	Power Outage	Shutdown		
11/9/2012	23:59:59	11/9/2012	23:59:59	115	0:00:00	Startup	Pilot On	Startup		
11/10/2012	0:00:00	11/10/2012	0:11:48	116	0:11:48	Shutdown	Power Outage	Shutdown		
11/10/2012	0:11:48	11/10/2012	0:11:48	117	0:00:00	Startup	Pilot On	Startup		
11/14/2012	0:29:41	11/14/2012	1:05:22	118	0:35:41	Shutdown	Power Outage	Shutdown		
11/14/2012	1:05:22	11/14/2012	1:05:22	119	0:00:00	Startup	Pilot On	Startup		
11/15/2012	4:04:39	11/15/2012	23:59:59	120	19:55:20	Shutdown	Kiln Maintenance	Shutdown		
11/16/2012	0:00:00	11/16/2012	0:15:27	121	0:15:27	Shutdown	Kiln Maintenance	Shutdown		
11/16/2012	0:15:27	11/16/2012	0:15:27	122	0:00:00	Startup	Pilot On	Startup		
11/18/2012	17:03:49	11/18/2012	21:19:19	123	4:15:30	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad	Stack Gas Flow Rate	Span	Adjusted Fuel Flow

11/19/2012	15:01:04	11/19/2012	15:01:43	124	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/19/2012	17:23:43	11/19/2012	17:24:58	125	0:01:15	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	2:01:49	11/20/2012	2:04:02	126	0:02:13	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure HRA	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	2:25:49	11/20/2012	3:01:13	127	0:35:24	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure HRA	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	7:15:09	11/20/2012	7:15:24	128	0:00:15	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	8:16:16	11/20/2012	8:16:28	129	0:00:12	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	8:42:26	11/20/2012	8:42:41	130	0:00:15	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	8:43:27	11/20/2012	8:44:23	131	0:00:56	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	14:42:40	11/20/2012	14:44:39	132	0:01:59	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure

11/20/2012	14:54:30	11/20/2012	14:55:10	133	0:00:40	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	19:03:15	11/20/2012	19:04:09	134	0:00:54	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	19:12:14	11/20/2012	19:14:26	135	0:02:12	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	20:11:17	11/20/2012	20:11:43	136	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	20:20:35	11/20/2012	20:21:02	137	0:00:27	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System and Frond End Kiln Pressure / No Visible Emissions	Simultaneous Instantaneous Front & Back Chamber Pressure	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	20:35:09	11/20/2012	20:35:31	138	0:00:22	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	20:36:07	11/20/2012	20:36:35	139	0:00:28	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	22:18:20	11/20/2012	22:19:11	140	0:00:51	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	22:19:50	11/20/2012	22:20:20	141	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	22:28:05	11/20/2012	22:28:29	142	0:00:24	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

11/20/2012	22:30:07	11/20/2012	22:30:33	143	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	22:32:19	11/20/2012	22:32:44	144	0:00:25	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	22:34:16	11/20/2012	22:35:34	145	0:01:18	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	23:10:15	11/20/2012	23:12:20	146	0:02:05	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System and Frond End Kiln Pressure / No Visible Emissions	Simultaneous Instantaneous Front & Back Chamber Pressure	Opl	Adjusted LGF Line Pressure and LGF Flow
11/21/2012	2:00:53	11/21/2012	2:08:58	147	0:08:05	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System and Frond End Kiln Pressure / No Visible Emissions	Simultaneous Instantaneous Front & Back Chamber Pressure	Opl	Adjusted LGF Line Pressure and LGF Flow
11/21/2012	11:08:31	11/21/2012	11:12:06	148	0:03:35	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/21/2012	11:54:46	11/21/2012	15:59:32	149	4:04:46	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/22/2012	11:28:58	11/22/2012	11:29:41	150	0:00:43	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/22/2012	11:48:23	11/22/2012	11:49:20	151	0:00:57	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure

11/22/2012	12:19:33	11/22/2012	12:20:50	152	0:01:17	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/22/2012	13:27:50	11/22/2012	13:28:56	153	0:01:06	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/22/2012	15:30:36	11/22/2012	15:31:01	154	0:00:25	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/22/2012	15:31:06	11/22/2012	15:31:55	155	0:00:49	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/24/2012	14:26:41	11/24/2012	14:29:01	156	0:02:20	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/25/2012	11:25:41	11/25/2012	11:26:08	157	0:00:27	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/25/2012	13:16:01	11/25/2012	13:16:23	158	0:00:22	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/25/2012	21:23:32	11/25/2012	21:27:20	159	0:03:48	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
11/26/2012	0:53:24	11/26/2012	0:54:46	160	0:01:22	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
11/26/2012	10:14:25	11/26/2012	10:23:11	161	0:08:46	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
11/27/2012	12:49:32	11/27/2012	14:59:02	162	2:09:30	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / I & E Cleaned Probe	Stack Gas Flow Rate	Span	I & E Cleaned Probe
11/28/2012	4:52:57	11/28/2012	22:59:02	163	18:06:05	Shutdown	Kiln Maintenance	Shutdown		
11/28/2012	22:59:02	11/28/2012	22:59:02	164	0:00:00	Startup	Pilot On	Startup		

11/30/2012	10:50:31	11/30/2012	11:03:17	165	0:12:46	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/1/2012	11:31:57	12/1/2012	11:36:32	166	0:04:35	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
12/4/2012	16:12:43	12/4/2012	16:45:56	167	0:33:13	Malfunction	Kiln 2 Was Down for Maintenance Which Affected the Efficiency of the Vacuum System for the Kiln Rear Chamber System	Back Chamber Pressure HRA	Opl	Closed the System Isolation Valve and Adjusted the Fresh Air Intake Valve
12/4/2012	21:17:27	12/4/2012	21:18:08	168	0:00:41	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/6/2012	18:42:27	12/6/2012	18:43:48	169	0:01:21	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/6/2012	20:44:59	12/6/2012	20:46:01	170	0:01:02	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Water From Mist Pad Flush Hitting the Probe	Stack Gas Flow Rate	Span	Reduced Mist Pad Rinse Water Flow and Reduced ID Fan Speed
12/6/2012	20:52:46	12/6/2012	21:11:27	171	0:18:41	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Water From Mist Pad Flush Hitting the Probe	Stack Gas Flow Rate	Span	Reduced Mist Pad Rinse Water Flow and Reduced ID Fan Speed
12/7/2012	11:32:09	12/7/2012	11:32:48	172	0:00:39	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/7/2012	16:00:43	12/7/2012	16:07:28	173	0:06:45	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/7/2012	22:41:03	12/7/2012	22:41:47	174	0:00:44	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/8/2012	1:01:04	12/8/2012	1:02:40	175	0:01:36	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/11/2012	14:30:04	12/11/2012	14:35:55	176	0:05:51	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/14/2012	15:10:43	12/14/2012	15:15:47	177	0:05:04	Malfunction	The Fan System Which Produces the Draft for the Rear Chamber System was Partially Plugged With Dust From the Very Dry Shale Feed	Back Chamber Pressure HRA	Opl	The Fan System Was Cleaned
12/15/2012	1:49:59	12/15/2012	1:52:39	178	0:02:40	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / I & E Cleaned Probe	Stack Gas Flow Rate	Span	I & E Cleaned Probe
12/17/2012	13:39:39	12/17/2012	13:40:22	179	0:00:43	Malfunction	The Fan System Which Produces the Draft for the Rear Chamber System was Partially Plugged With Dust From the Very Dry Shale Feed	Back Chamber Pressure HRA	Opl	The Fan System Was Cleaned
12/18/2012	11:00:13	12/18/2012	11:00:29	180	0:00:16	Malfunction	Strong Wind Gusts Out of the Northwest Affected the Reference Pressure Monitor Which Reduced the Differential Pressure at the Front End of the Kiln	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Cooler and Barron Fans to Increase the Differential Pressure
12/18/2012	11:00:34	12/18/2012	11:00:47	181	0:00:13	Malfunction	Strong Wind Gusts Out of the Northwest Affected the Reference Pressure Monitor Which Reduced the Differential Pressure at the Front End of the Kiln	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Cooler and Barron Fans to Increase the Differential Pressure

12/18/2012	11:00:51	12/18/2012	11:01:07	182	0:00:16	Malfunction	Strong Wind Gusts Out of the Northwest Affected the Reference Pressure Monitor Which Reduced the Differential Pressure at the Front End of the Kiln	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Cooler and Barron Fans to Increase the Differential Pressure
12/18/2012	11:01:11	12/18/2012	11:01:49	183	0:00:38	Malfunction	Strong Wind Gusts Out of the Northwest Affected the Reference Pressure Monitor Which Reduced the Differential Pressure at the Front End of the Kiln	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Cooler and Barron Fans to Increase the Differential Pressure
12/20/2012	6:17:53	12/20/2012	7:18:45	184	1:00:52	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	8:29:26	12/20/2012	9:23:50	185	0:54:24	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / I & E Cleaned Probe	Stack Gas Flow Rate	Span	I & E Cleaned Probe
12/20/2012	9:24:19	12/20/2012	9:25:02	186	0:00:43	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	9:27:45	12/20/2012	9:34:46	187	0:07:01	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	14:25:38	12/20/2012	14:26:54	188	0:01:16	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	19:07:40	12/20/2012	19:08:04	189	0:00:24	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	19:08:08	12/20/2012	19:09:05	190	0:00:57	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	19:18:30	12/20/2012	19:36:39	191	0:18:09	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned

12/20/2012	19:37:04	12/20/2012	19:56:43	192	0:19:39	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	20:27:40	12/20/2012	20:27:58	193	0:00:18	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	20:28:02	12/20/2012	20:28:16	194	0:00:14	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	22:11:06	12/20/2012	22:11:35	195	0:00:29	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	22:11:39	12/20/2012	22:11:52	196	0:00:13	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/20/2012	23:06:02	12/20/2012	23:06:59	197	0:00:57	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	1:10:38	12/21/2012	1:11:23	198	0:00:45	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	2:00:41	12/21/2012	2:01:34	199	0:00:53	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	2:01:39	12/21/2012	2:02:24	200	0:00:45	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned

12/21/2012	2:11:03	12/21/2012	2:11:51	201	0:00:48	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	2:12:30	12/21/2012	2:13:19	202	0:00:49	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	2:15:53	12/21/2012	2:16:15	203	0:00:22	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	2:16:19	12/21/2012	2:17:01	204	0:00:42	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	3:13:19	12/21/2012	3:13:55	205	0:00:36	Malfunction	An Inspection of the Rear Chamber System Was Conducted During a Kiln Shutdown on 12/21/12. During the Inspection, Several Inside Seals Were Found to be Worn As Well As the Fan System Partially Plugged With Dust	Back Chamber Pressure, 1 Second Delay	Opl	During the Kiln Shutdown, the Worn Inner Seals Were Replaced and the Fan System Fully Cleaned
12/21/2012	4:12:56	12/21/2012	23:59:59	206	19:47:03	Shutdown	Kiln Maintenance	Shutdown		
12/22/2012	0:00:00	12/22/2012	3:50:13	207	3:50:13	Shutdown	Kiln Maintenance	Shutdown		
12/22/2012	3:50:13	12/22/2012	3:50:13	208	0:00:00	Startup	Pilot On	Startup		
12/24/2012	15:09:26	12/24/2012	15:10:18	209	0:00:52	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/28/2012	12:15:22	12/28/2012	12:23:03	210	0:07:41	Malfunction	The End of the Burn Tank Was Reached Which Caused a Pressure Pulse in the Kiln System as the Flame Pulsed Which Affected the Frontend Kiln Differential Pressure	Front Kiln Pressure, 1 Second Delay	Opl	Switched Tanks and Reestablished Fuel Flows
12/30/2012	18:24:13	12/30/2012	22:24:44	211	4:00:31	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad Due to High Ducon Pressure	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/30/2012	22:41:33	12/30/2012	22:51:03	212	0:09:30	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Residual Water Droplets From Rinsing the Mist Pad Hitting the Stack Gas Probe	Stack Gas Flow Rate	Span	Reduced ID Fan Speed to Help Reduce Water Droplet Carry In the Stack
12/31/2012	22:33:24	12/31/2012	22:33:59	213	0:00:35	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Residual Water Droplets From Rinsing the Mist Pad Hitting the Stack Gas Probe	Stack Gas Flow Rate	Span	Reduced ID Fan Speed to Help Reduce Water Droplet Carry In the Stack

12/31/2012	22:39:07	12/31/2012	22:41:04	214	0:01:57	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Residual Water Droplets From Rinsing the Mist Pad Hitting the Stack Gas Probe	Stack Gas Flow Rate	Span	Reduced ID Fan Speed to Help Reduce Water Droplet Carry In the Stack
12/31/2012	22:50:01	12/31/2012	22:50:40	215	0:00:39	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Residual Water Droplets From Rinsing the Mist Pad Hitting the Stack Gas Probe	Stack Gas Flow Rate	Span	Reduced ID Fan Speed to Help Reduce Water Droplet Carry In the Stack
12/31/2012	23:22:08	12/31/2012	23:25:54	216	0:03:46	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span Due to Residual Water Droplets From Rinsing the Mist Pad Hitting the Stack Gas Probe	Stack Gas Flow Rate	Span	Reduced ID Fan Speed to Help Reduce Water Droplet Carry In the Stack

TOTAL TIME ON HAZARDOUS WASTE: 3578.66 hours or 81% of reporting period.
TOTAL PRODUCTION TIME: 4036.03 hours or 91% of reporting period.

NORLITE, LLC
PERIODIC STARTUP, SHUTDOWN AND MALFUNCTION REPORT and
THE EXCESS EMISSIONS AND MONITORING SYSTEM PERFORMANCE REPORT
40 CFR 63.10(d)(5)(i) and 40 CFR 63.10(e)(3)
7/1/12 thru 12/31/12
KILN 2

Start Date	Start Time	End Date	End Time	#	Downtime	Event	Cause	Parameter	Limit	Corrective Action
7/3/2012	9:36:36	7/3/2012	9:40:09	1	0:03:33	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/3/2012	10:30:10	7/3/2012	10:31:32	2	0:01:22	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/6/2012	11:54:23	7/6/2012	11:55:45	3	0:01:22	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/6/2012	11:57:46	7/6/2012	11:58:15	4	0:00:29	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/6/2012	12:10:33	7/6/2012	12:10:59	5	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/6/2012	17:13:10	7/6/2012	17:13:35	6	0:00:25	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/7/2012	23:09:14	7/7/2012	23:09:39	7	0:00:25	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

7/8/2012	1:28:21	7/8/2012	1:28:46	8	0:00:25	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/8/2012	1:28:53	7/8/2012	1:29:14	9	0:00:21	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/8/2012	13:59:46	7/8/2012	14:00:16	10	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/8/2012	14:14:02	7/8/2012	14:15:09	11	0:01:07	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/8/2012	18:35:27	7/8/2012	23:59:59	12	5:24:32	Shutdown	Kiln Maintenance	Shutdown		
7/9/2012	0:00:00	7/9/2012	23:59:59	13	23:59:59	Shutdown	Kiln Maintenance	Shutdown		
7/10/2012	0:00:00	7/10/2012	20:10:18	14	20:10:18	Shutdown	Kiln Maintenance	Shutdown		
7/10/2012	20:10:18	7/10/2012	20:10:18	15	0:00:00	Startup	Pilot On	Startup		
7/11/2012	21:00:55	7/11/2012	21:14:54	16	0:13:59	Malfunction	Instantaneous Upper Instrument Setpoint Reached for LGF Flow Span / Cleared Ball Valve	LGF Flow	Span	Adjusted Fuel Flow
7/12/2012	20:25:25	7/12/2012	20:26:04	17	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/13/2012	4:53:43	7/13/2012	4:54:11	18	0:00:28	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/14/2012	4:03:00	7/14/2012	17:06:31	19	13:03:31	Shutdown	Power Outage In Order to Conduct Plant Electrical Maintenance	Shutdown		
7/14/2012	17:06:31	7/14/2012	17:06:31	20	0:00:00	Startup	Pilot On	Startup		
7/18/2012	8:49:46	7/18/2012	8:50:13	21	0:00:27	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

7/19/2012	14:08:11	7/19/2012	14:09:34	22	0:01:23	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
7/23/2012	23:04:24	7/23/2012	23:10:27	23	0:06:03	Shutdown	Power Outage	Shutdown		
7/23/2012	23:10:27	7/23/2012	23:10:27	24	0:00:00	Startup	Pilot On	Startup		
7/30/2012	1:59:22	7/30/2012	2:00:18	25	0:00:56	Malfunction	Instantaneous Upper Instrument Setpoint Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
7/30/2012	2:05:14	7/30/2012	2:07:41	26	0:02:27	Malfunction	The LGF Pump Stopped Which Caused a LGF Fuel Flow Surge Triggering the Instantaneous Upper Instrument Setpoint To Be Reached for LGF Flow Span	LGF Flow	Span	Restarted the LGF Pump and Adjusted Fuel Flow
7/30/2012	2:08:07	7/30/2012	2:10:59	27	0:02:52	Malfunction	The LGF Pump Stopped Which Caused a LGF Fuel Flow Surge Triggering the Instantaneous Upper Instrument Setpoint To Be Reached for LGF Flow Span	LGF Flow	Span	Restarted the LGF Pump and Adjusted Fuel Flow
7/30/2012	4:26:05	7/30/2012	5:28:00	28	1:01:55	Malfunction	The Used Oil Flow Surged Which Caused a Sudden Increase in the Flame Which Caused the CO's to Rise	Carbon Monoxide	Opl	Adjusted Fuel Flow
8/1/2012	19:30:39	8/1/2012	19:39:10	29	0:08:31	Malfunction	The End of the Burn Tank was Reached Which Caused a LGF Fuel Flow Surge Triggering the Instantaneous Upper Instrument Setpoint To Be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
8/3/2012	19:51:53	8/3/2012	20:56:50	30	1:04:57	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions / High CO's	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/3/2012	22:02:34	8/3/2012	22:03:43	31	0:01:09	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/3/2012	22:33:57	8/3/2012	22:34:19	32	0:00:22	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/3/2012	22:36:17	8/3/2012	22:36:39	33	0:00:22	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

8/4/2012	0:48:51	8/4/2012	0:50:07	34	0:01:16	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/7/2012	0:30:25	8/7/2012	0:30:52	35	0:00:27	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/8/2012	16:05:43	8/8/2012	16:06:40	36	0:00:57	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/11/2012	7:31:55	8/11/2012	7:32:18	37	0:00:23	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
8/11/2012	19:26:43	8/11/2012	20:03:51	38	0:37:08	Shutdown	Scrubber Maintenance	Shutdown		
8/11/2012	20:03:51	8/11/2012	20:03:51	39	0:00:00	Startup	Pilot On	Startup		
8/17/2012	11:06:46	8/17/2012	11:57:04	40	0:50:18	Malfunction	An Investigation Revealed the Reference Port for the Rear Chamber Differential Pressure System Was Partially Plugged, Causing the System to Reach the Span Limit	Back Chamber Pressure, 1 Second Delay	Opl	I & E Cleaned Out the Reference Port and Recalibrated the System
8/17/2012	15:28:13	8/17/2012	15:32:12	41	0:03:59	Malfunction	An Investigation Revealed the Reference Port for the Rear Chamber Differential Pressure System Was Partially Plugged, Causing the System to Reach the Span Limit	Back Chamber Pressure, 1 Second Delay	Opl	I & E Cleaned Out the Reference Port and Recalibrated the System
8/17/2012	16:22:17	8/17/2012	16:44:16	42	0:21:59	Malfunction	An Investigation Revealed the Reference Port for the Rear Chamber Differential Pressure System Was Partially Plugged, Causing the System to Reach the Span Limit	Back Chamber Pressure, 1 Second Delay	Opl	I & E Cleaned Out the Reference Port and Recalibrated the System
8/18/2012	18:50:43	8/18/2012	18:56:32	43	0:05:49	Malfunction	An Investigation Revealed the Reference Port for the Rear Chamber Differential Pressure System Was Partially Plugged, Causing the System to Reach the Span Limit	Back Chamber Pressure, 1 Second Delay	Opl	I & E Cleaned Out the Reference Port and Recalibrated the System
8/20/2012	20:03:54	8/20/2012	23:59:59	44	3:56:05	Shutdown	Kiln Maintenance	Shutdown		
8/21/2012	0:00:00	8/21/2012	23:59:59	45	23:59:59	Shutdown	Kiln Maintenance	Shutdown		
8/22/2012	0:00:00	8/22/2012	23:59:59	46	23:59:59	Shutdown	Kiln Maintenance	Shutdown		
8/23/2012	0:00:00	8/23/2012	23:59:59	47	23:59:59	Shutdown	Kiln Maintenance	Shutdown		
8/24/2012	0:00:00	8/24/2012	6:15:02	48	6:15:02	Shutdown	Kiln Maintenance	Shutdown		
8/24/2012	6:15:02	8/24/2012	6:15:02	49	0:00:00	Startup	Pilot On	Startup		

8/28/2012	19:12:40	8/28/2012	23:59:59	50	4:47:19	Shutdown	Kiln Maintenance	Shutdown		
8/29/2012	0:00:00	8/29/2012	14:36:47	51	14:36:47	Shutdown	Kiln Maintenance	Shutdown		
8/29/2012	14:36:47	8/29/2012	14:36:47	52	0:00:00	Startup	Pilot On	Startup		
9/1/2012	0:16:31	9/1/2012	0:17:06	53	0:00:35	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/1/2012	0:43:15	9/1/2012	0:44:00	54	0:00:45	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/4/2012	17:22:21	9/4/2012	17:22:51	55	0:00:30	Malfunction	Instantaneous Upper Instrument Setpoint Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
9/6/2012	21:52:00	9/6/2012	21:58:59	56	0:06:59	Malfunction	The Operator Went Off LGF to Stop a Kiln Pressure Cutoff From Occurring. The Sudden Stop of LGF Flow Caused a Pressure Pulse in the Kiln System Which Caused a Rear Chamber Pressure Cutoff	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/7/2012	4:13:57	9/7/2012	4:14:17	57	0:00:20	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/8/2012	2:51:10	9/8/2012	2:51:58	58	0:00:48	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/10/2012	13:11:42	9/10/2012	13:12:02	59	0:00:20	Malfunction	LGF Line Pressure Fluctuated Significantly Which Caused LGF Flow Control with Valves to be Difficult. The Pressure Changes Caused a Pressure Pulse in the Kiln System Which Affected the Rear Chamber System	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/11/2012	3:55:39	9/11/2012	3:56:56	60	0:01:17	Malfunction	The Kiln Operator was Attempting to Reestablish LGF Fuel Flow After a Tank Switch. The LGF Line Pressure was High Due to the Tank Switch Which Made Fine Control with a Valve Difficult, Resulting in a Pressure Pulse In The Kiln System	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow
9/12/2012	2:13:50	9/12/2012	2:14:28	61	0:00:38	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

9/12/2012	16:45:36	9/12/2012	16:49:16	62	0:03:40	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/13/2012	0:14:59	9/13/2012	0:15:28	63	0:00:29	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow
9/13/2012	0:52:58	9/13/2012	0:53:41	64	0:00:43	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/13/2012	1:06:45	9/13/2012	1:13:52	65	0:07:07	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/15/2012	6:18:38	9/15/2012	6:19:17	66	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/18/2012	15:19:45	9/18/2012	23:59:59	67	8:40:14	Shutdown	Kiln Maintenance	Shutdown		
9/19/2012	0:00:00	9/19/2012	17:03:47	68	17:03:47	Shutdown	Kiln Maintenance	Shutdown		
9/19/2012	17:03:47	9/19/2012	17:03:47	69	0:00:00	Startup	Pilot On	Startup		
9/20/2012	22:47:25	9/20/2012	22:48:26	70	0:01:01	Malfunction	After A Tank Switch, the Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln System that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/20/2012	23:49:33	9/20/2012	23:50:16	71	0:00:43	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/23/2012	15:23:16	9/23/2012	15:25:16	72	0:02:00	Malfunction	Operator was Controlling LGF Fuel Flow Using Valves Which Caused a Fuel Flow Surge that Triggered the Instantaneous Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow

9/27/2012	4:53:21	9/27/2012	4:53:51	73	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/28/2012	3:47:54	9/28/2012	3:48:19	74	0:00:25	Malfunction	After A Tank Switch, the Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln System that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/28/2012	9:12:37	9/28/2012	9:12:56	75	0:00:19	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
9/28/2012	20:13:19	9/28/2012	20:14:26	76	0:01:07	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/1/2012	4:09:45	10/1/2012	20:02:28	77	15:52:43	Shutdown	Kiln Maintenance	Shutdown		
10/1/2012	20:02:28	10/1/2012	20:02:28	78	0:00:00	Startup	Pilot On	Startup		
10/3/2012	8:31:19	10/3/2012	8:31:49	79	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/3/2012	11:21:39	10/3/2012	13:13:26	80	1:51:47	Shutdown	Kiln Maintenance	Shutdown		
10/3/2012	13:13:26	10/3/2012	13:13:26	81	0:00:00	Startup	Pilot On	Startup		
10/5/2012	0:53:11	10/5/2012	0:53:40	82	0:00:29	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/9/2012	0:02:20	10/9/2012	0:04:24	83	0:02:04	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/9/2012	2:52:59	10/9/2012	2:53:38	84	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge Triggering the Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow

10/9/2012	3:13:33	10/9/2012	3:14:06	85	0:00:33	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/9/2012	3:14:11	10/9/2012	3:14:42	86	0:00:31	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/9/2012	4:34:38	10/9/2012	4:35:02	87	0:00:24	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/9/2012	11:58:05	10/9/2012	11:58:43	88	0:00:38	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/10/2012	0:32:14	10/10/2012	0:32:43	89	0:00:29	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/10/2012	15:05:15	10/10/2012	15:05:54	90	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/10/2012	20:34:17	10/10/2012	20:39:19	91	0:05:02	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow with Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge Triggering the Upper Instrument Setpoint to be Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
10/14/2012	18:04:54	10/14/2012	18:05:42	92	0:00:48	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/16/2012	12:54:12	10/16/2012	12:54:42	93	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

10/17/2012	19:44:32	10/17/2012	19:45:49	94	0:01:17	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/18/2012	5:49:53	10/18/2012	5:50:19	95	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/18/2012	6:32:02	10/18/2012	6:32:28	96	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/19/2012	13:33:19	10/19/2012	13:33:50	97	0:00:31	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/19/2012	16:01:37	10/19/2012	16:18:50	98	0:17:13	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/20/2012	2:30:46	10/20/2012	2:31:26	99	0:00:40	Malfunction	The LGF Flow Was Intermittent Which Caused a Pressure Pulse to Occur in the Kiln. The Intermittent Flow was Most Likely Due to the Kiln Operator Controlling LGF Fuel Flow with Valves and High LGF Line Pressure / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/20/2012	2:55:24	10/20/2012	3:12:47	100	0:17:23	Malfunction	A Stack Gas Cutoff Occurred Which Caused a Loss in LGF Flow That Triggered a Pressure Pulse in the Kiln System. The Pulse Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/21/2012	4:24:32	10/21/2012	4:25:28	101	0:00:56	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/21/2012	9:04:25	10/21/2012	9:05:51	102	0:01:26	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

10/21/2012	10:56:31	10/21/2012	10:57:21	103	0:00:50	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/21/2012	11:00:20	10/21/2012	11:03:08	104	0:02:48	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/22/2012	10:32:58	10/22/2012	10:33:28	105	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/22/2012	10:45:55	10/22/2012	10:47:03	106	0:01:08	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/22/2012	10:49:07	10/22/2012	12:00:14	107	1:11:07	Malfunction	A Stack Gas Cutoff Occurred Which Caused a Loss in LGF Flow That Triggered a Pressure Pulse in the Kiln System. The Pulse Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/22/2012	12:14:17	10/22/2012	12:14:49	108	0:00:32	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Scrubber Recirc. Rate	Scrubber Recirc. Rate	Span	Adjusted Scrubber Recirc. Rate
10/23/2012	18:50:18	10/23/2012	18:50:36	109	0:00:18	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/23/2012	18:58:54	10/23/2012	18:59:12	110	0:00:18	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/23/2012	19:55:08	10/23/2012	19:55:39	111	0:00:31	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/23/2012	20:14:26	10/23/2012	20:14:49	112	0:00:23	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow

10/23/2012	20:43:55	10/23/2012	20:44:18	113	0:00:23	Malfunction	The Differential Pressure in the Rear Chamber System Started Fluctuating Which Caused the Automated Valve to Start Opening and Closing. The Fluctuating Pressure Was Caused by a Partially Plugged Pressure Reference Tube	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/25/2012	9:42:04	10/25/2012	23:14:38	114	13:32:34	Shutdown	Kiln Maintenance	Shutdown		
10/25/2012	23:14:38	10/25/2012	23:14:38	115	0:00:00	Startup	Pilot On	Startup		
10/27/2012	6:42:12	10/27/2012	6:43:21	116	0:01:09	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
10/27/2012	7:53:00	10/27/2012	7:53:22	117	0:00:22	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
10/27/2012	12:55:54	10/27/2012	12:56:20	118	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
10/27/2012	13:05:26	10/27/2012	13:06:02	119	0:00:36	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
10/27/2012	14:57:52	10/27/2012	14:58:20	120	0:00:28	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
10/29/2012	13:32:50	10/29/2012	13:33:10	121	0:00:20	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Scrubber Recirc. Span	Scrubber Recirc. Rate	Span	Adjusted Scrubber Recirc. Rate
10/29/2012	14:23:23	10/29/2012	14:29:35	122	0:06:12	Shutdown	Kiln Maintenance	Shutdown		
10/29/2012	14:29:35	10/29/2012	14:29:35	123	0:00:00	Startup	Pilot On	Startup		
10/29/2012	14:50:24	10/29/2012	16:33:30	124	1:43:06	Shutdown	Pilot Tripped After Initial Restart	Shutdown		
10/29/2012	16:33:30	10/29/2012	16:33:30	125	0:00:00	Startup	Pilot On	Startup		
10/30/2012	5:45:58	10/30/2012	6:54:25	126	1:08:27	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Rear Chamber Pressure Which Caused the Differential Pressure at the Rear Chamber System to Decrease and Cause a Rear Chamber System Cutoff to Occur	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
10/31/2012	5:02:46	10/31/2012	5:04:50	127	0:02:04	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow

11/1/2012	13:43:42	11/1/2012	13:46:29	128	0:02:47	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/3/2012	8:37:16	11/3/2012	13:31:45	129	4:54:29	Shutdown	Kiln Maintenance	Shutdown		
11/3/2012	13:31:45	11/3/2012	13:31:45	130	0:00:00	Startup	Pilot On	Startup		
11/3/2012	22:09:19	11/3/2012	23:15:22	131	1:06:03	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Rear Chamber Pressure Which Caused the Differential Pressure at the Rear Chamber System to Decrease and Cause a Rear Chamber System Cutoff to Occur	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Cooler and ID Fans to Reestablish Proper Draft
11/3/2012	23:31:58	11/3/2012	23:33:37	132	0:01:39	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Rear Chamber Pressure Which Caused the Differential Pressure at the Rear Chamber System to Decrease and Cause a Rear Chamber System Cutoff to Occur	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Cooler and ID Fans to Reestablish Proper Draft
11/3/2012	23:37:42	11/3/2012	23:38:22	133	0:00:40	Malfunction	Strong Wind Gusts Out of the Northwest Caused Changes to the Reference Rear Chamber Pressure Which Caused the Differential Pressure at the Rear Chamber System to Decrease and Cause a Rear Chamber System Cutoff to Occur	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Cooler and ID Fans to Reestablish Proper Draft
11/5/2012	7:21:55	11/5/2012	7:22:23	134	0:00:28	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/7/2012	16:09:32	11/7/2012	20:34:27	135	4:24:55	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad and Scrubber	Stack Gas Flow Rate	Span	Rinsed Mist Pad and Adjusted Fuel Flow
11/7/2012	20:45:20	11/7/2012	22:34:32	136	1:49:12	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Drained Venturi From Water Buildup	Stack Gas Flow Rate	Span	Drained Venturi and Adjusted Fuel Flow
11/11/2012	22:58:32	11/11/2012	23:54:47	137	0:56:15	Shutdown	Kiln Going Down for Maintenance	Shutdown		
11/11/2012	23:54:47	11/11/2012	23:54:47	138	0:00:00	Startup	Pilot On	Startup		
11/12/2012	0:02:21	11/12/2012	0:47:44	139	0:45:23	Shutdown	Kiln Going Down for Maintenance	Shutdown		
11/12/2012	0:47:44	11/12/2012	0:47:44	140	0:00:00	Startup	Pilot On	Startup		
11/12/2012	0:59:07	11/12/2012	2:30:01	141	1:30:54	Shutdown	Kiln Going Down for Maintenance	Shutdown		
11/12/2012	2:30:01	11/12/2012	2:30:01	142	0:00:00	Startup	Pilot On	Startup		
11/12/2012	4:12:22	11/12/2012	4:18:39	143	0:06:17	Shutdown	Kiln Going Down for Maintenance	Shutdown		
11/12/2012	4:18:39	11/12/2012	4:18:39	144	0:00:00	Startup	Pilot On	Startup		
11/12/2012	5:48:37	11/12/2012	5:55:15	145	0:06:38	Shutdown	Kiln Going Down for Maintenance	Shutdown		
11/12/2012	5:55:15	11/12/2012	5:55:15	146	0:00:00	Startup	Pilot On	Startup		
11/12/2012	9:05:16	11/12/2012	23:59:59	147	14:54:43	Shutdown	Kiln Maintenance	Shutdown		
11/13/2012	0:00:00	11/13/2012	23:30:07	148	23:30:07	Shutdown	Kiln Maintenance	Shutdown		
11/13/2012	23:30:07	11/13/2012	23:30:07	149	0:00:00	Startup	Pilot On	Startup		

11/16/2012	3:52:53	11/16/2012	3:53:21	150	0:00:28	Malfunction	Kiln 1 Was Down for Maintenance Which Caused A Decrease in the Effectiveness of the Draft System for the Rear Chamber System of Kiln 2	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/16/2012	3:53:33	11/16/2012	3:53:55	151	0:00:22	Malfunction	Kiln 1 Was Down for Maintenance Which Caused A Decrease in the Effectiveness of the Draft System for the Rear Chamber System of Kiln 2	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/16/2012	20:12:45	11/16/2012	20:13:20	152	0:00:35	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/17/2012	1:02:29	11/17/2012	1:03:46	153	0:01:17	Malfunction	The Venturi Scrubber Was Partially Plugged Which Decreased the Overall Draft in the Kiln System Which Affected the Rear Chamber System	Back Chamber Pressure HRA	Opl	Pulled the Headers to Try To Free Up the Soda Ash Scale
11/17/2012	4:25:52	11/17/2012	4:27:02	154	0:01:10	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/17/2012	14:04:26	11/17/2012	15:36:51	155	1:32:25	Malfunction	The Venturi Scrubber Was Partially Plugged Which Decreased the Overall Draft in the Kiln System Which Affected the Rear Chamber System	Back Chamber Pressure HRA	Opl	Pulled the Headers to Try To Free Up the Soda Ash Scale
11/17/2012	16:03:08	11/17/2012	16:03:38	156	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/18/2012	0:23:55	11/18/2012	1:26:39	157	1:02:44	Malfunction	The Venturi Scrubber Was Partially Plugged Which Decreased the Overall Draft in the Kiln System Which Affected the Rear Chamber System and Front End Kiln Pressure	Simultaneous Front and Back Chamber Pressure	Opl	Pulled the Headers to Try to Free Up the Soda Ash Scale
11/18/2012	5:59:00	11/18/2012	7:11:29	158	1:12:29	Malfunction	Lost Pilot Which Stopped LGF Flow. When Reintroduced to Fuel, A Fuel Flow Surge Occurred Which Caused CO's to Spike	Carbon Monoxide	Opl	Adjusted Fuel Flow
11/19/2012	10:12:03	11/19/2012	12:40:52	159	2:28:49	Malfunction	The Mist Pad Was Partially Plugged and Building Up Water Which Was Affecting the Stack Gas Probe, Causing the Instantaneous Upper Instrument Setpoint to be Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Rinsed Mist Pad and Adjusted Fuel Flow
11/19/2012	13:33:46	11/19/2012	13:34:16	160	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency

11/20/2012	8:28:53	11/20/2012	8:32:27	161	0:03:34	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System and Frond End Kiln Pressure / No Visible Emissions	Simultaneous Front and Back Chamber	Opl	Adjusted LGF Line Pressure and LGF Flow
11/20/2012	9:05:22	11/20/2012	9:07:57	162	0:02:35	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/20/2012	9:17:31	11/20/2012	9:20:18	163	0:02:47	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	10:40:42	11/20/2012	10:41:40	164	0:00:58	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/20/2012	13:05:17	11/20/2012	13:11:01	165	0:05:44	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	14:40:40	11/20/2012	14:42:26	166	0:01:46	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/20/2012	22:43:31	11/20/2012	22:43:57	167	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/20/2012	22:45:40	11/20/2012	22:46:05	168	0:00:25	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	22:49:06	11/20/2012	22:49:28	169	0:00:22	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/20/2012	22:51:59	11/20/2012	22:56:51	170	0:04:52	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency

11/20/2012	23:00:36	11/20/2012	23:01:02	171	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/20/2012	23:04:52	11/20/2012	23:05:22	172	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/20/2012	23:26:56	11/20/2012	23:27:50	173	0:00:54	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/21/2012	12:25:42	11/21/2012	12:27:12	174	0:01:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/22/2012	10:27:00	11/22/2012	10:56:00	175	0:29:00	CEM	Train B, CO High Span	Monitoring Equip.	Span	Recalibrated
11/23/2012	10:46:38	11/23/2012	10:47:54	176	0:01:16	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/23/2012	12:24:37	11/23/2012	12:25:36	177	0:00:59	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/23/2012	13:13:50	11/23/2012	13:14:29	178	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/23/2012	13:19:30	11/23/2012	14:47:45	179	1:28:15	Malfunction	The Previous Cutoff Caused a Loss of Fuel Flow Which Caused the CO's to Rise	Carbon Monoxide	Opl	Adjusted Fuel Flow
11/23/2012	15:11:47	11/23/2012	15:12:26	180	0:00:39	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency

11/23/2012	15:33:46	11/23/2012	16:14:33	181	0:40:47	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/24/2012	9:18:59	11/24/2012	9:19:23	182	0:00:24	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/24/2012	11:06:43	11/24/2012	11:07:42	183	0:00:59	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/24/2012	14:00:53	11/24/2012	14:01:54	184	0:01:01	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/24/2012	14:02:29	11/24/2012	14:03:25	185	0:00:56	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/26/2012	12:27:20	11/26/2012	12:27:50	186	0:00:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/27/2012	7:21:56	11/27/2012	13:03:16	187	5:41:20	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Stack Gas Probe Failed	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
11/28/2012	10:20:35	11/28/2012	11:38:50	188	1:18:15	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions / High CO's	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/28/2012	18:56:05	11/28/2012	18:56:30	189	0:00:25	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System and Front End Kiln Pressure / No Visible Emissions	Simultaneous Front and Back Chamber	Opl	Adjusted Fuel Flow and LGF Line Pressure

11/28/2012	21:10:06	11/28/2012	21:10:25	190	0:00:19	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	1:35:54	11/29/2012	1:36:35	191	0:00:41	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System	Front Kiln Pressure, 1 Second Delay	Opl	Adjusted Fuel Flow and LGF Line Pressure
11/29/2012	9:53:40	11/29/2012	9:54:58	192	0:01:18	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	10:48:59	11/29/2012	10:50:43	193	0:01:44	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	10:51:37	11/29/2012	10:55:46	194	0:04:09	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	11:23:47	11/29/2012	11:26:12	195	0:02:25	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	13:43:22	11/29/2012	13:44:49	196	0:01:27	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	15:09:44	11/29/2012	15:11:10	197	0:01:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency
11/29/2012	15:36:29	11/29/2012	15:37:07	198	0:00:38	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Norlite Personnel Closed the Fresh Air In-Take Valve to Help Improve the Draft System Efficiency

12/1/2012	2:46:23	12/1/2012	2:47:04	199	0:00:41	Malfunction	Kiln Operators Were Using Valves to Control Fuel Flow. A Fuel Flow Surge was Experienced Due to High LGF Line Pressure Which Caused a Pressure Pulse in the Kiln System That Affected the Front End and Rear Chamber Pressures	Simultaneous Front and Back Chamber	Opl	Adjusted Fuel Flow and LGF Line Pressure
12/2/2012	1:25:52	12/2/2012	2:31:43	200	1:05:51	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions / Flame Out / High CO's	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted
12/2/2012	4:05:03	12/2/2012	4:07:30	201	0:02:27	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted
12/2/2012	7:42:09	12/2/2012	7:43:40	202	0:01:31	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted
12/2/2012	11:08:24	12/2/2012	11:09:36	203	0:01:12	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted
12/2/2012	12:32:04	12/2/2012	12:34:45	204	0:02:41	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted

12/2/2012	14:03:41	12/2/2012	14:05:11	205	0:01:30	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted
12/3/2012	5:58:22	12/3/2012	5:59:27	206	0:01:05	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	The Kiln Was Shutdown on 12/04/12 for Maintenance. During that Time, an Inspection and Maintenance of the Internal Seals of the Chamber System was Conducted
12/6/2012	23:15:44	12/6/2012	23:16:05	207	0:00:21	Malfunction	Instantaneous Upper Instrument Setpoint Reached for LGF Flow Span	LGF Flow	Span	Adjusted Fuel Flow
12/7/2012	1:15:16	12/7/2012	2:00:40	208	0:45:24	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / I & E Cleaned Probe	Stack Gas Flow Rate	Span	I & E Cleaned Probe
12/7/2012	6:04:16	12/7/2012	6:04:42	209	0:00:26	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
12/8/2012	3:42:18	12/8/2012	5:04:50	210	1:22:32	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Flushed Mist Pad	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/8/2012	6:01:37	12/8/2012	6:02:04	211	0:00:27	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/10/2012	20:49:24	12/10/2012	20:49:42	212	0:00:18	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
12/11/2012	18:12:19	12/11/2012	21:06:10	213	2:53:51	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / Rinsed Mist Pad / I & E Cleaned Stack Gas Probe	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/14/2012	7:18:42	12/14/2012	7:19:19	214	0:00:37	Malfunction	The Kiln Operator was Controlling LGF Fuel Flow With Valves and High LGF Line Pressure Which Caused a Fuel Flow Surge. This Triggered a Pressure Pulse in the Kiln that Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
12/18/2012	21:28:08	12/18/2012	21:39:24	215	0:11:16	Malfunction	When Water Flow was Reestablished to the Scrubber System, a Sudden Flush of Water Caused a Water Mist to Hit the Stack Gas Flow Probe	Stack Gas Flow Rate	Span	Reduced Scrubber Recirculation Flow

12/19/2012	0:50:14	12/19/2012	0:50:31	216	0:00:17	Malfunction	After a Tank Switch, the LGF Line Pressure was High Which Made Flow Control with Valves Difficult. This Resulted in a Fuel Flow Surge Which Caused a Pressure Spike in the Kiln System That Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
12/19/2012	0:50:38	12/19/2012	0:51:00	217	0:00:22	Malfunction	After a Tank Switch, the LGF Line Pressure was High Which Made Flow Control with Valves Difficult. This Resulted in a Fuel Flow Surge Which Caused a Pressure Spike in the Kiln System That Affected the Rear Chamber System / No Visible Emissions	Back Chamber Pressure, 1 Second Delay	Opl	Adjusted LGF Line Pressure and LGF Flow
12/20/2012	19:04:22	12/20/2012	19:04:46	218	0:00:24	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/20/2012	19:36:58	12/20/2012	19:37:17	219	0:00:19	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Back Chamber Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/21/2012	4:15:22	12/21/2012	4:15:39	220	0:00:17	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/21/2012	4:15:53	12/21/2012	4:16:14	221	0:00:21	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/21/2012	4:19:18	12/21/2012	4:19:52	222	0:00:34	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/21/2012	4:54:59	12/21/2012	4:55:30	223	0:00:31	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/21/2012	7:46:37	12/21/2012	8:24:55	224	0:38:18	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span / I & E Cleaned Probe	Stack Gas Flow Rate	Span	I & E Cleaned Probe
12/21/2012	8:57:36	12/21/2012	9:01:01	225	0:03:25	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/21/2012	10:12:06	12/21/2012	10:12:51	226	0:00:45	Malfunction	Kiln 1 Was Down for Maintenance Which Affected the Efficiency of the Fan System Used to Produce the Draft for the Rear Chamber System. Maintenance Was Also Conducted on the Fan System Which Affected the Rear Chamber System Operation	Back Chamber Pressure, 1 Second Delay	Opl	Conducted Maintenance On the Fan System Which Produced Draft and Closed the Fresh Air Intake Valve

12/21/2012	10:13:27	12/21/2012	10:20:26	227	0:06:59	Malfunction	Kiln 1 Was Down for Maintenance Which Affected the Efficiency of the Fan System Used to Produce the Draft for the Rear Chamber System. Maintenance Was Also Conducted on the Fan System Which Affected the Rear Chamber System Operation	Back Chamber Pressure, 1 Second Delay	Opl	Conducted Maintenance On the Fan System Which Produced Draft and Closed the Fresh Air Intake Valve
12/21/2012	10:42:08	12/21/2012	10:42:49	228	0:00:41	Malfunction	Kiln 1 Was Down for Maintenance Which Affected the Efficiency of the Fan System Used to Produce the Draft for the Rear Chamber System. Maintenance Was Also Conducted on the Fan System Which Affected the Rear Chamber System Operation	Back Chamber Pressure, 1 Second Delay	Opl	Conducted Maintenance On the Fan System Which Produced Draft and Closed the Fresh Air Intake Valve
12/21/2012	10:45:30	12/21/2012	11:53:29	229	1:07:59	Malfunction	Kiln 1 Was Down for Maintenance Which Affected the Efficiency of the Fan System Used to Produce the Draft for the Rear Chamber System. Maintenance Was Also Conducted on the Fan System Which Affected the Rear Chamber System Operation	Back Chamber Pressure, 1 Second Delay	Opl	Conducted Maintenance On the Fan System Which Produced Draft and Closed the Fresh Air Intake Valve
12/21/2012	11:59:40	12/21/2012	12:00:25	230	0:00:45	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/21/2012	12:48:42	12/21/2012	12:49:58	231	0:01:16	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Southeast	Front Kiln Pressure, 1 Second Delay	Opl	The Mist Pad Was Flushed Out On 12/21/12 at 5:00 AM
12/24/2012	21:50:57	12/24/2012	21:52:09	232	0:01:12	Malfunction	Instantaneous Upper Instrument Setpoint Reached for Stack Gas Span	Stack Gas Flow Rate	Span	Adjusted Fuel Flow
12/28/2012	1:15:08	12/28/2012	1:15:35	233	0:00:27	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Northwest	Front Kiln Pressure, 1 Second Delay	Opl	Rinsed the Mist Pad and Adjusted the Cooler and Barron Fans to Improve the Frontend Kiln Pressure
12/28/2012	1:15:43	12/28/2012	1:16:04	234	0:00:21	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Northwest	Front Kiln Pressure, 1 Second Delay	Opl	Rinsed the Mist Pad and Adjusted the Cooler and Barron Fans to Improve the Frontend Kiln Pressure
12/28/2012	1:25:33	12/28/2012	1:25:52	235	0:00:19	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Northwest	Front Kiln Pressure, 1 Second Delay	Opl	Rinsed the Mist Pad and Adjusted the Cooler and Barron Fans to Improve the Frontend Kiln Pressure
12/28/2012	7:30:25	12/28/2012	7:30:49	236	0:00:24	Malfunction	The Mist Pad Was Partially Plugged with Soda Ash Solids Which Reduced the Overall Kiln System Draft, Making the Kiln More Susceptible to Strong Wind Gusts Out of the Northwest	Front Kiln Pressure, 1 Second Delay	Opl	Rinsed the Mist Pad and Adjusted the Cooler and Barron Fans to Improve the Frontend Kiln Pressure

TOTAL TIME ON HAZARDOUS WASTE: 3407.50 hours or 77% of reporting period.
TOTAL PRODUCTION TIME: 3949.57 hours or 89% of reporting period.